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## Claims

- 10 1. Clock-pulse supply unit comprising a phase detector for comparing the phase of a first clock pulse with the phase of a second clock pulse, a first receiver unit for receiving the first clock pulse and relaying the first clock pulse to the phase detector , and a second receiver unit which has the same parameters as the first receiver unit and serves to receive the second clock pulse and relay  
15 the second clock pulse to the phase detector .
2. Clock-pulse supply unit according to Claim 1, comprising an oscillator is provided for generating the second clock pulse, and a transmitter unit is connected between the oscillator and the second receiver unit in such a way that  
20 the second clock pulse generated in the oscillator is supplied to the second receiver unit via the transmitter unit.
3. Clock-pulse supply unit according to Claim 2, comprising a changeover switch with one input and two outputs is provided, the input of the changeover  
25 switch is connected to the output of the transmitter unit, and an output of the changeover switch is connected to an artificial line.
4. Clock-pulse supply unit according to Claim 2, comprising the oscillator is designed as a voltage-controlled oscillator whose control voltage is dependent  
30 on the output signal of the phase detector .

5. Clock-pulse supply unit according to Claim 2, comprising a divider is provided, connected between the oscillator and the phase detector , and the divider and the second receiver unit which have a control input for active and passive switching of the divider and the second receiver unit.

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6. Clock-pulse supply unit according to Claim 1, comprising the first and the second receiver unit have the same time delay.

7. Clock-pulse supply unit according to Claim 1, comprising a reference clock-pulse changeover switch is provided whose output is connected to the output of the first receiver unit, and the reference clock-pulse changeover switch and the first receiver unit which have a control input for active and passive switching of the reference clock-pulse changeover switch and the first receiver unit.

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8. Clock-pulse supply unit according to Claim 3, comprising the artificial line is suitable for simulation of a system clock-pulse bus.

9. Clock-pulse supply unit according to either of Claims 3 or 7, comprising the first receiver unit is suitable for receiving a system clock pulse from a system clock-pulse bus, the changeover switch is suitable for switching the clock pulse received from the transmitter unit to the system clock-pulse bus, and the reference clock-pulse changeover switch is suitable for supplying to the phase detector at least one reference clock pulse, the frequency of which is lower than the frequency of the system clock pulse.

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10. Clock-pulse supply unit comprising two clock-pulse supply units according to Claim 9 and a common control unit for controlling the changeover switches and reference clock-pulse changeover switches of the clock-pulse supply units.

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